

Emerging Legal and Policy Strategies for Climate Change Adaptation: Opportunities and Constraints for Action in Africa

By

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Outline of the Presentation

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- What is Africa?
- The Trends of Climate Change in Africa
- Climate change effects on Africa
- Opportunities for Climate Change Adaptation in Africa
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- Conclusion and Recommendations

What is Africa

- Africa is the world's second-largest and second most-populous continent, after Asia. At about 30.2 million km² (11.7 million sq mi) including adjacent islands, it covers 6% of the Earth's total surface area and 20.4% of the total land area.
- It has 54 countries identified by their respective colonial heritage but also by desert, wildlife, forest, rivers, mountains, coasts and culture.
- With about 922 million people (as of 2005) it accounts for about 14.2% of the world's human population.
- The continent shares the Atlantic Ocean to its west with North and South America, joined at the north eastern tip to Asia, and the Mediterranean Sea traverses the north linking southern Europe.
- The continent is surrounded by the Mediterranean Sea to the north, the Suez Canal and the Red Sea to the northeast, the Indian Ocean to the southeast, and the Atlantic Ocean to the west.

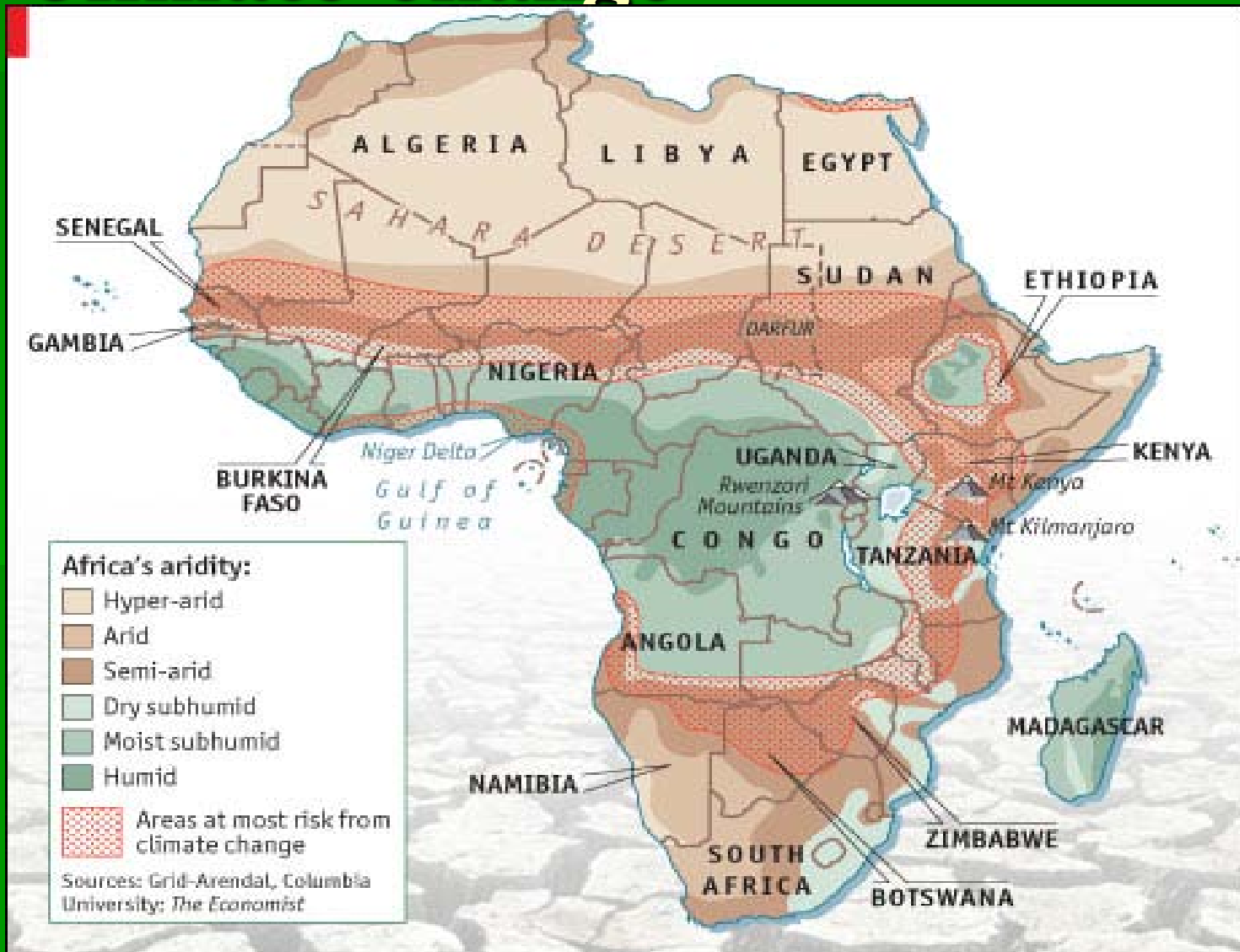
What is Africa cont'd

- The climate of Africa ranges from tropical to sub-arctic on its highest peaks.
- Its northern half is primarily desert or arid while its East, central and southern areas contain both savanna plains and very dense jungle (rainforest) regions.
- Africa has perhaps the world's largest combination of animal population
- It has numerous rivers such as one of the longest rivers in the world the Nile; the Niger the Congo and the Zambezi and large inland lakes such as Lake Victoria and Volta.
- Africa has three main deserts - the Sahara which dominates the North, the Kalahari and the Namibia to the southern parts of the continent.
- The Eastern and Southern plains of Africa are renowned for the amazing array of wildlife and their respective lifestyles..

Trends of Climate Change in Africa

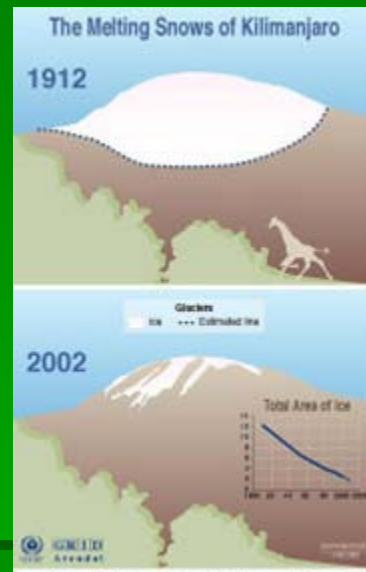
- When the Climate change started in the African continent and when it will end is subject to endless debate. The Climate of the continent is nonetheless changing.
- It is believed that the continent is on the average 0.5C warmer than it was 100 years ago and temperatures have risen much higher in some areas - such as a part of Kenya which has become 3.5C hotter in the past 20 years.
- Climate is important for development in Africa but natural climate fluctuations from autonomous climate cycles (such as those linked to the El Nino phenomenon) disrupt ecological, economic and social systems.
- Africa contributes minimally to green house gases because on average more than 50 percent of the population are involved directly in agriculture.

Map of Africa indicating the trend of Climate change



Climate change effects on Africa

- Most of the effects are Water related
- ✓ Unusual effects of hot climate include reduction of snow on Mountains



Effects of Climate Change Cont'd

- Drought



Effects of Climate Change



Opportunities for responding to climate change in Africa

- There are two basic approaches to responding to climate change: mitigation and adaptation.
- **Mitigation** refers to limiting global climate change through human interventions to reduce sources, or enhance the sinks, of greenhouse gases. Hence it aims at improving long-term climate patterns by reducing the hazard of climate change impacts.
- **Adaptation** is defined as adjustments in ecological, social or economic systems in response to actual or expected climatic stimuli and their effects or impacts. Therefore it aims at moderating the adverse effects of climate change by reducing vulnerability to climate effects through a wide range of interventions.

Adaptation and Mitigation Approaches cont'd

- The two approaches of mitigation and adaptation are not mutually exclusive in responding to climate change effects: both are necessary in addressing climate change risks.
- However, the choice of either approach, or the optimal combination, depends on several considerations, including the underlying nature of climate risks, the technical knowledge about climate change, development context of decision-making and time-lags to realize benefits of implementing the specific approach.

Advantages of Using Adaptation Measures in Africa

- Adaptation Measures can be applied in a shorter term whereas mitigation is a long-term process;
- In terms of sustainability, adaptation measures are cheaper than mitigation interventions;
- Since Africa contributes relatively low percentages of GHG emissions, investments in adaptation measures is cost effective.

Advantages of Adaptation

Cont'd

- Adaptation measures do not require expert knowledge such as assessment of climate change risks therefore they are easier to apply in Africa where there is limited knowledge on climate patterns and safe levels of GHG concentrations
- the uncertainty of the effectiveness of adaptation measures is smaller less than that of mitigation such as climate patterns and safe levels of GHG concentrations
- given uncertainties regarding future emissions and their consequences, it is appropriate to apply the precautionary principle to develop policies and plans that will ensure timely adaptations.

Emerging Opportunities under the International Legal and Policy Systems

Opportunities:

1. Clean Development Mechanism under the Kyoto Protocol
 - ✓ One of the flexible mechanisms of the Kyoto Protocol is the Clean Development Mechanism (CDM).
 - ✓ CDM is defined under Article 12 of the Kyoto Protocol as a cooperative effort between Annex 1 parties and non-Annex 1 parties who are parties to the Kyoto protocol.
 - ✓ It is a market-based approach that calls for private companies in the developed world to invest in GHG mitigation projects in developing countries as a means to achieve their GHG emission reduction targets Greenhouse gases

CDM Cont'd

Basically, the CDM has three objectives:

- ✓ to assist Parties not included in Annex I (i.e. developing countries) in achieving sustainable development;
- ✓ to contribute to the ultimate objective of the Convention (i.e. stabilize greenhouse gas Concentrations in the atmosphere at a level that would prevent dangerous anthropogenic interference with the climate system a
- ✓ to assist Parties included in Annex I (developed countries) in achieving compliance with their quantified emission limitation and reduction commitments under Article 3 of the Kyoto Protocol.

Advantages of implementing CDM projects in Africa

- Promotes sustainable development in those countries, while allowing developed countries to contribute to the goal of reducing atmospheric concentrations of greenhouse gases.
- Offers to catalyzing green investment priorities in African countries, the CDM offers an opportunity to make progress simultaneously on climate, development, and local environmental issues.
- Benefits African countries by giving them access to technology and investment that they would be unlikely to get otherwise, which helps them to develop sustainably, and thereby contribute to the ultimate objective of the UNFCCC and the Kyoto Protocol

Bali Decisions 2007

- There were two important decisions in addition to Bali Action Plan that have implications for adaptation and mitigation in Africa.
 1. Reducing emissions from deforestation and degradation (REDD) or avoided deforestation which is seen as a possible mechanism for a post-2012 regime.
 - ✓ It is mechanism which is designed to offset carbon emissions by preventing deforestation.
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 - ✓ REDD could be a market and/or a payment mechanism for the carbon conserved.

Bali Decisions cont'd

2. The launching of the Adaptation Fund which is supposed to help poor countries that lack the money, technology and human resources to cope with climate change.
- ✓ Funding is supposed to come from a two per cent levy on revenues generated by the clean development mechanism, the scheme allowing industrialized nations to pay for carbon credits produced by emission-reduction projects in the developing world and credit them against their own emissions targets.

Nairobi Work Programme

Nairobi Work Programme (2005-2010)

- Improve understanding and assessment of impacts, vulnerability and adaptation to climate change;
- Make informed decisions on practical adaptation actions and measures to respond to climate change on a sound scientific, technical and socio-economic basis, taking into account current and future climate change and variability

Johannesburg Declaration

Johannesburg Declaration 2002

- Noted that the adverse effects of climate change are evident, natural disasters are more frequent and more devastating, and developing countries more vulnerable.
- Reaffirmed that focus priority attention be given natural disasters

Copenhagen Accord

- Para 3 noted that adaptation to the adverse effects of climate change and the potential impacts of response measures is a challenge faced by all countries and there is urgent need to enhance action and international cooperation on adaptation .
- Obliges the developed country parties to assist developing countries parties which are particularly vulnerable to adverse effects of climate change to meet the costs of adapting to the effects
- Establishes the Copenhagen Green Climate Fund to address the adaptation and mitigation needs of the least-developed countries especially the small island developing states and Africa.

Cancun Declaration

Cancun Declaration 2010

- Established Green Climate Fund to support projects, programmes, policies and other activities in developing country Parties using thematic funding windows.
- Established Cancun Adaptation Framework to enhance action on adaptation, including through international cooperation and coherent consideration of matters relating to adaptation under the Convention.

Durban Platform

Durban Platform 2011 sought to:

- the operationalize the Green Climate Fund.
- Establish an Ad Hoc Working Group on the Durban Platform for Enhanced Action including, inter alia, on mitigation, adaptation, finance, technology development and transfer, transparency of action, and support and capacity-building, drawing upon submissions from Parties and relevant technical, social and economic information and expertise.

Rio Declaration 2012

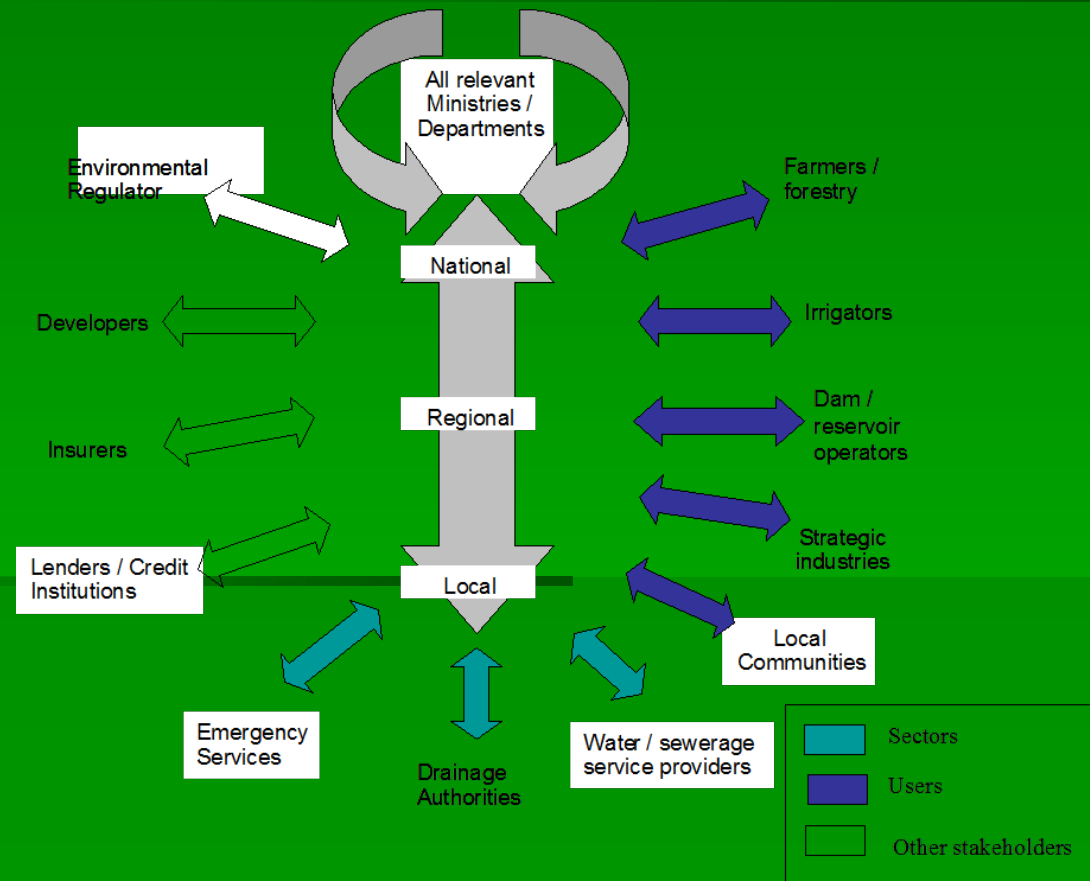
Rio Declaration 2012- THE FUTURE WE WANT

- Noted that that combatting climate change requires urgent and ambitious action, in accordance with the principles and provisions of the UNFCCC.
- Reaffirmed the necessity to promote, enhance and support enhancing resilience to climate change and natural disasters.
- Called for more coordinated and comprehensive strategies that integrate disaster risk reduction and climate change adaptation considerations into public and private investment, decision making

Constraints to Adaptation to Climate Change in Africa

- Poverty
- Limited awareness about climate change adaptation measures
- Low technology
- Limited of Government structure & Political will
- Limited funding

Conclusion : Integrate Adaptation into the national planning processes



Recommendation for Adaptation measures in Africa

- Weather and Climate Change Monitoring
- Development of a Specific Climate Policy and Law
- Capacity Building
- Establishment of Climate Change Fund at the National Levels
- Development of Long-term Adaptation Action Plan
- Re-strengthening the Climate Change Regime
- Debt for Nature Swap
- Green Aid